



NIST Combinatorial Methods Center

NCMC-8: Polymer Formulations II **October 27-28, 2005 ♦ Bldg. 101 / Lecture Rm. A**

Thursday, October 27th, 2005

8:00 am Registration
Continental Breakfast

8:30 am Welcome and Introduction
Michael Fasolka, *Director, NCMC*

8:45 am Formulations Project Overview
Kathryn Beers, *NCMC*

9:15 am Keynote Lecture:
Klavs Jensen, *Massachusetts Institute of Technology*

10:00 am *Coffee Break*

10:20 am Optical Manipulation of Nanocontainers and Nanotubes from Self-assembled Membranes
Kristian Helmerson, *Physics Lab, NIST*

10:50 am Perfluoropolyethers as Enabling Materials in Micro- and Nano-technologies
Jason Rolland, *Liquidia*

11:20 am Micro-scale machine technologies
Bradley Damazo, *Manufacturing Eng. Lab, NIST*

11:45 am *Lunch (NIST cafeteria, Bldg. 101)*

1:15 pm Keynote Lecture:
Robert Lochhead, *University of Southern Mississippi*

2:00 pm Warts, glory and the consumer... High throughput research at Unilever R & D Port Sunlight
Sarah Hosking, *Unilever*

2:30 pm *Coffee Break*

3:00 pm Novel Photonic Devices as Enabled by a New Electro-Optic Architecture
Scott Davis, *Vescent Photonics*

3:30 pm Combinatorial Studies of the Effect of Polymer Grafting Density on Protein Adsorption and Cell Adhesion
Ying Mei, *NIST Polymers*

4:00 pm Poster Session

6:30 pm *Dinner (Dogfish Head Ale House)*

Friday, October 28th, 2005

8:30 am *Continental Breakfast*

9:00 am On-line Spectroscopic Monitoring of Polymer Reactions in Microfluidic Devices
Susan Barnes, *NCMC*

9:30 am Solution and Surface Gradients from Microchannel Confinement
Chang Xu, *NCMC*

10:00 am Evaluation of Interfacial Adhesion Strength using Compositional Libraries of Epoxy Films
Jae Hyun Kim, *NIST Polymers*

10:25 am *Coffee Break*

10:55 am Recent Developments in SIEBIMM and Reverse SIEBIMM
Shu Guo, *NCMC*

11:20 am A Combinatorial Melt Micro-rheometer for Characterization of Polymer Resins
Anthony Bur, *NCMC*

11:45 am NCMC Update
Michael Fasolka, *Director, NCMC*

12:00 pm *Lunch (NIST cafeteria, Bldg. 101)*

1:30 pm **NCMC lab tours, demos, etc.**

4:00 pm Meeting End